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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/506,890	09/07/2004	Tsutomu Matsubara	1163-0515PUS1	6698

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EXAMINER	
VO, HUYEN X	

ART UNIT	PAPER NUMBER
2626	

NOTIFICATION DATE	DELIVERY MODE
12/17/2008	ELECTRONIC

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Notice of the Office communication was sent electronically on above-indicated "Notification Date" to the following e-mail address(es):

mailroom@bskb.com

Office Action Summary	Application No.	Applicant(s)	
	10/506,890	MATSUBARA ET AL.	
	Examiner	Art Unit	
	HUYEN X. VO	2626	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE *3* MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

1)☒ Responsive to communication(s) filed on *23 September 2008*.

2a)☐ This action is **FINAL**. 2b)☒ This action is non-final.

3)☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

4)☒ Claim(s) *9-16 and 18-20* is/are pending in the application.

4a) Of the above claim(s) _____ is/are withdrawn from consideration.

5)☐ Claim(s) _____ is/are allowed.

6)☒ Claim(s) *9-16 and 18-20* is/are rejected.

7)☐ Claim(s) _____ is/are objected to.

8)☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

9)☐ The specification is objected to by the Examiner.

10)☒ The drawing(s) filed on *07 September 2004* is/are: a)☒ accepted or b)☐ objected to by the Examiner.

Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).

Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).

11)☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

12)☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).

a)☒ All b)☐ Some * c)☐ None of:

1.☒ Certified copies of the priority documents have been received.

2.☐ Certified copies of the priority documents have been received in Application No. _____.

3.☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

1) ☒ Notice of References Cited (PTO-892)
2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
3) ☐ Information Disclosure Statement(s) (PTO/SB/08) Paper No(s)/Mail Date _____.
4) ☐ Interview Summary (PTO-413) Paper No(s)/Mail Date. _____ .
5) ☐ Notice of Informal Patent Application
6) ☒ Other: *spec*.

DETAILED ACTION

Claim Rejections - 35 USC § 103

1. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

> (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.

2. Claim 9 is rejected under 35 U.S.C. 103(a) as being unpatentable over Nakata (USPN 7379876) in view of Ryuji (JP Publication No. 11-126092, already of record).

3. Regarding claim 9, Nakata discloses a vehicle mounted control apparatus (*col. 8, lines 1-3*) comprising:

a switch accessible by a driver of a vehicle, the switch being actuated by the driver to select executing a command execution mode (*col. 8, lines 4-16, many operational switches for operating the devices*);

a voice command receiver inside the vehicle that receives a voice command input when the command execution mode is executed (*col. 17, lines 42-55, receiving input speech command to control a particular function in a particular device*);

a voice recognition section operably connected to the voice command input device for recognizing the voice command input by the voice receiver (*col. 18, lines 12-26, recognizing the input speech command*);

a user interface on an interior surface of the vehicle (*figures 11A-B*), the user interface being actuated by a nonverbal input by the driver to select executing an operation guidance mode (*elements 42-43 in figure 11A*), the user interface including a display device that provides visual operation guidance to the driver regarding the command execution mode when the operation guidance mode is executed (*referring to figures 11A-B and/or steps S5-S6 in figure 3*);

a control section operably connected to the switch and the user interface (*referring to figure 1, all system components are interconnected*), the control section executing the command execution mode in response to the driver actuating the switch (*elements 42-43 in figure 11A*), the control section executing the operation guidance mode in response to the driver actuating the user interface by the nonverbal input (*referring to figure 1 and/or elements 42-43 in figure 11A*),

a command execution section that executes the voice command when the voice command is recognized by the voice recognition section (*figure 12, S83*).

Nakata fails to specifically disclose wherein the control section analyzes a cause of incapability of recognition of the voice command when the voice command cannot be recognized by the voice recognition section and gives a visual notice on the result of the analysis via the display device. However, Ryuji teaches a control section that analyzes a cause of incapability of recognition of the voice command when the voice command cannot be recognized by the voice recognition section and gives a notice on result of the analysis *(abstract section).*

Since Nakata and Ryuji are analogous art because they are from the same field of endeavor, it would have been obvious to one of ordinary skill in the art at the time of invention to modify Nakata by incorporating the teaching of Ryuji in order to alert the user of the possible source that causes misrecognition or un-recognition of the input so that action can be taken improve speech recognition accuracy.

4. Claims 10-16 and 18-20 are rejected under 35 U.S.C. 103(a) as being unpatentable over Nakata (USPN 7379876) in view of Ryuji (JP Publication No. 11-126092, already of record), and further in view of Takehiko (JP Publication No. 09-292895, already of record).

5. Regarding claim 10, the modified Nakata fails to specifically disclose the vehicle mounted control apparatus as claimed in claim 9, wherein said visual notice is performed by a change of a display format on the display device. However, Takehiko further teaches that said visual notice is performed by a change of a display format on the display device (*abstract section; different appearance of the face*).

Since the modified Nakata and Takehiko are analogous art because they are from the same field of endeavor, it would have been obvious to one of ordinary skill in the art at the time of invention to further modify Nakata by incorporating the teaching of Ryuji in order to alert the user of the possible source that causes misrecognition or un-recognition of the input so that action can be taken improve speech recognition accuracy.

6. Regarding claim 11, Nakata discloses a vehicle mounted control apparatus comprising:

a switch accessible by a driver of a vehicle, the switch being actuated by the driver to select executing a processing of command execution mode (*col. 8, lines 4-16, many operational switches for operating the devices*);

a voice command receiver inside the vehicle that receives a voice command input when the command execution mode is executed (*col. 17, lines 42-55, receiving input speech command to control a particular function in a particular device*);

a voice recognition section operably connected to the voice command receiver for recognizing a-the voice command input by the voice receiver (*col. 18, lines 12-26, recognizing the input speech command*);

a user interface on an interior surface of the vehicle (*figures 11A-B*), the user interface being actuated by a nonverbal input by the driver to select executing an operation guidance mode (*elements 42-43 in figure 11A*), the user interface including a display device that provides visual operation guidance to the driver regarding the command execution mode when the operation guidance mode is executed (*referring to figures 11A-B and/or steps S5-S6 in figure 3*);

a control section operably connected to the switch and the user interface (*referring to figure 1, all system components are interconnected*), the control section executing the command execution mode in response to the driver actuating the switch (*elements 42-43 in figure 11A*), the control section executing the operation guidance

mode in response to the driver actuating the user interface (*referring to figure 1 and/or elements 42-43 in figure 11A*),

Nakata fails to specifically disclose wherein the control section performs an analysis to determine a particular cause of incapability of recognition of the voice command when the voice command cannot be recognized by the voice recognition section. However, Ryuji teaches the control section performs an analysis to determine a particular cause of incapability of recognition of the voice command when the voice command cannot be recognized by the voice recognition section *(abstract section).*

Since the modified Nakata and Takehiko are analogous art because they are from the same field of endeavor, it would have been obvious to one of ordinary skill in the art at the time of invention to further modify Nakata by incorporating the teaching of Ryuji in order to alert the user of the possible source that causes misrecognition or un-recognition of the input so that action can be taken improve speech recognition accuracy.

The modified Nakata still fails to specifically disclose a storage section that stores a correspondence between different display formats and different causes of incapability of recognition by the voice recognition section, wherein the control section reads the display format corresponding to the particular cause determined by the result of analysis from the storage section and gives a visual notice of the particular cause by changing a screen of the display device to exhibit the on read display format. However, Takehiko further teaches a storage section that stores a correspondence between different display formats and different causes of incapability of recognition by the voice

recognition section (*abstract section; different appearance of the face*), wherein the control section reads the display format corresponding to the particular cause determined by the result of analysis from the storage section and gives a visual notice of the particular cause by changing a screen of the display device to exhibit the on read display format (*abstract section; different appearance of the face*).

Since the modified Nakata and Takehiko are analogous art because they are from the same field of endeavor, it would have been obvious to one of ordinary skill in the art at the time of invention to further modify Nakata by incorporating the teaching of Ryuji in order to alert the user of misrecognition or un-recognition of the input so that action can be taken improve speech recognition accuracy.

7. Regarding claims 12-15, Nakata further discloses vehicle mounted control apparatus as claimed in claim 10, wherein the display format is a display format of an icon displayed on the screen, wherein the display format is a display format of an icon displayed on the screen, wherein the display format of the icon is a color of the icon displayed on the screen, and wherein the display format of the icon is a color of the icon displayed on the screen (*referring to figures 11A-B and 15A-B; color display is well-known in navigation system*).

8. Regarding claim 16, Nakata discloses a vehicle mounted control apparatus (*referring to figure 1*) comprising:

a switch accessible by a driver of a vehicle, the switch being actuated by the driver to select executing a processing of command execution mode (*col. 8, lines 4-16, many operational switches for operating the devices*);

a voice command receiver inside the vehicle that receives a voice command input when the command execution mode is executed (*col. 17, lines 42-55, receiving input speech command to control a particular function in a particular device*);

a voice recognition section operably connected to the voice command receiver for recognizing a-the voice command input by a-the voice command receiver (*col. 18, lines 12-26, recognizing the input speech command*);

a user interface on an interior surface of the vehicle (*figures 11A-B*), the user interface being actuated by a nonverbal input by the driver to select executing an operation guidance mode (*elements 42-43 in figure 11A*), the user interface including a display device that provides visual operation guidance to the driver regarding the command execution mode when the operation guidance mode is executed (*referring to figures 11A-B and/or steps S5-S6 in figure 3*); and

a control section operably connected to the switch and the user interface (*referring to figure 1, all system components are interconnected*), the control section executing the command execution mode in response to the driver actuating the switch (*elements 42-43 in figure 11A*), the control section executing the operation guidance mode in response to the driver actuating the user interface by the nonverbal input (*referring to figure 1 and/or elements 42-43 in figure 11A*),

wherein the control section displays a sample of a voice command on a screen of the display device when the operation guidance is executed, the sample corresponding to the voice command to be input when the command execution mode is executed (*referring to figures 15A-B*).

Nakata fails to specifically disclose wherein the control section analyzes a cause of incapability of recognition of the voice command when the voice command cannot be recognized by the voice recognition section and gives a visual notice on the result of the analysis via the display device. However, Ryuji teaches wherein the control section analyzes a cause of incapability of recognition of the voice command when the voice command cannot be recognized by the voice recognition section *(abstract section).*

Since the modified Nakata and Takehiko are analogous art because they are from the same field of endeavor, it would have been obvious to one of ordinary skill in the art at the time of invention to further modify Nakata by incorporating the teaching of Ryuji in order to alert the user of the possible source that causes misrecognition or un-recognition of the input so that action can be taken improve speech recognition accuracy.

The modified Nakata still fails to specifically disclose gives a visual notice on the result of the analysis via the display device. However, Takehiko further teaches gives a visual notice on the result of the analysis via the display device (*abstract section; different appearance of the face*).

Since the modified Nakata and Takehiko are analogous art because they are from the same field of endeavor, it would have been obvious to one of ordinary skill in

the art at the time of invention to further modify Nakata by incorporating the teaching of Ryuji in order to alert the user of misrecognition or un-recognition of the input so that action can be taken improve speech recognition accuracy.

9. Regarding claims 18-20, Nakata further discloses the vehicle mounted control apparatus as claimed in claim 9, wherein the display device operates as an operation guide that displays a menu providing guidance on operation and guidance on a selected operation when the control section executes the operation guidance mode, wherein further the display device operates as an operation guide that displays a menu providing guidance on operation and guidance on a selected operation when the control section executes the operation guidance mode, wherein the display device operates as an operation guide that displays a menu providing guidance on operation and guidance on a selected operation when the section executes the operation guidance mode (*referring to figures 11A-B and 15A-B*).

Conclusion

Any inquiry concerning this communication or earlier communications from the examiner should be directed to HUYEN X. VO whose telephone number is (571)272-7631. The examiner can normally be reached on M-F, 9-5:30.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Patrick Edouard can be reached on 571-272-7603. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

/Huyen X Vo/ 12/11/2008
Primary Examiner, Art Unit 2626

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